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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/502,393

07/26/2004

Manabu Ogawa

Q82712

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07/12/2006

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EXAMINER

SHAH, MANISH S

ART UNIT

PAPER NUMBER

2853

DATE MAILED: 07/12/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/502,393

Applicant(s)

OGAWA ET AL.

Examiner

Manish S. Shah

Art Unit

2853

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                        | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)               | Paper No(s)/Mail Date. ____.  |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>7/26/04</u> .   | 6) <input type="checkbox"/> Other: ____.                                    |

## DETAILED ACTION

### *Double Patenting*

1. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

2. Claims 1 & 10-13 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1, 19-21 of copending Application No. 10/503763 in view of Kato (# US 6440203).

The copending application (10/503763) discloses all the limitation of present application's claims 1 & 10-13 except that the ink has a conductivity of 0.01 S/m to 10 S/m.

Kato teaches that to have the printed image with excellent color and fixation, ink composition has a conductivity of 2 S/m (column: 12, line: 5-11).

It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the ink composition of copending application by the aforementioned teaching of Kato in order to have a printed image with excellent color and fixation.

This is a provisional obviousness-type double patenting rejection.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

1. Claims 1-5 are rejected under 35 U.S.C. 102(e) as being anticipated by Taguchi et al. (# US 2004/0066438 A1).

The applied reference has a common Assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

Ishizuka et al. discloses :

1. An ink for ink jet recording, comprising a aqueous medium and a phthalocyanine dye ([0100]) dissolved or dispersed in the aqueous medium ([0148], see Examples), wherein the phthalocyanine dye has an oxidation potential of more positive than 1.0 V ([0045]) and the ink has a conductivity of 0.01 S/m to 10 S/m ([0183]).

2 & 3. The ink has a viscosity of 1 to 20 mPa.sec at 25.degree. C ([0188]) and has a static surface tension of 25 to 50 mN/m at 25.degree. C ([0192]).

4. The ink for ink jet recording according to claim 2, wherein a viscosity of the ink has a viscosity ratio of not greater than 250% from at 25.degree. C. to at 10.degree. C., and a static surface tension have a static surface tension ratio of not greater than 130% from at 25.degree. C. to at 10.degree. C (see Examples).

5. The ink for ink jet recording according to claim 1, which has a pH value of 4 to 12 at 25.degree. C ([0180]).

2. Claims 1-4 & 6-15 are rejected under 35 U.S.C. 102(e) as being anticipated by Ishizuka et al. (# US 2004/0010052 A1).

The applied reference has a common Assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

Ishizuka et al. discloses :

1. An ink for ink jet recording, comprising a aqueous medium and a phthalocyanine dye ([0113]) dissolved or dispersed in the aqueous medium ([0249]-[0250]), wherein the phthalocyanine dye has an oxidation potential of more positive than 1.0 V ([0012], [0235]) and the ink has a conductivity of 0.01 S/m to 10 S/m ([0244]-[0248]; see Examples).

2 & 3. The ink has a viscosity of 1 to 20 mPa.sec at 25.degree. C and has a static surface tension of 25 to 50 mN/m at 25.degree. C ([0259]).

4. The ink for ink jet recording according to claim 2, wherein a viscosity of the ink has a viscosity ratio of not greater than 250% from at 25.degree. C. to at 10.degree. C., and a static surface tension have a static surface tension ratio of not greater than 130% from at 25.degree. C. to at 10.degree. C (see Examples).

6. The ink has a dye remaining ratio of not smaller than 60% after 24 hours of storage in an atmosphere of 5 ppm ozone in a monochromatic area that is obtained by printing with a monochromatic ink in such a manner a cyan reflection density through a status A filer is from 0.9 to 1.1 ([0309]-[0310]).

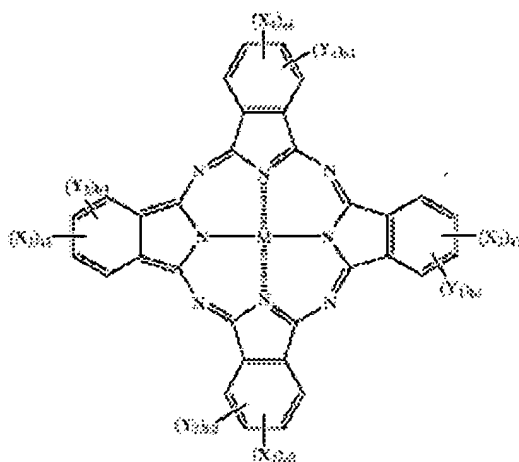
7. The ink for ink jet recording according to claim 1, wherein the ink has Cu ions that are eluted with water in an amount of not greater than 20% of a total amount of the dye after an ozone fading (see Examples; Table: 2).

8. The ink for ink jet recording according to claim 1, wherein the phthalocyanine dye is a water-soluble dye having an electron-withdrawing group at .beta.-position of a benzene ring in the phthalocyanine ([0017]).

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9. The ink for ink jet recording according to claim 1, wherein the phthalocyanine dye is a water-soluble dye that is produced by a process which doesn't pass through a sulfonation of an unsubstituted phthalocyanine ([0017]).

10. The phthalocyanine dye is represented by the following formula (I): ([0016]-[0017]).

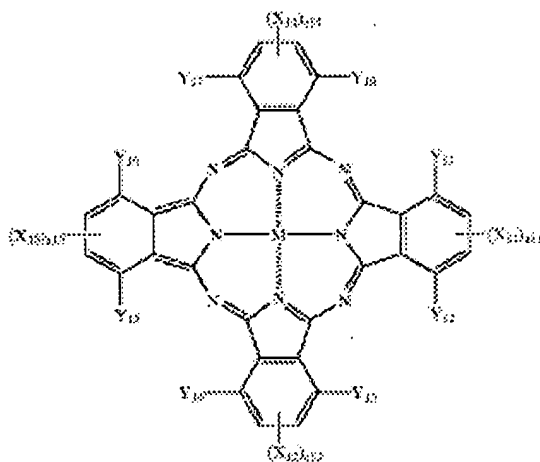


wherein X1, X2, X3 and X4 each independently represent --SO-Z, --SO<sub>2</sub>-Z, --SO<sub>2</sub>NR<sub>1</sub>R<sub>2</sub>, sulfo group, --CONR<sub>1</sub>R<sub>2</sub> or --CO<sub>2</sub>R<sub>1</sub>; Z represents a substituted or unsubstituted alkyl group, substituted or unsubstituted cycloalkyl group, substituted or unsubstituted alkenyl group, substituted or unsubstituted aralkyl group, substituted or unsubstituted aryl group or substituted or unsubstituted heterocyclic group; R<sub>1</sub> and R<sub>2</sub> each independently represent a hydrogen atom, substituted or unsubstituted alkyl group, substituted or unsubstituted cycloalkyl group, substituted or unsubstituted alkenyl group, substituted or unsubstituted aralkyl group; substituted or unsubstituted aryl group or substituted or unsubstituted heterocyclic group; and when there are a plurality of Z's, they may be the same or different; Y<sub>1</sub>, Y<sub>2</sub>, Y<sub>3</sub> and Y<sub>4</sub> each independently

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represent a monovalent substituent; and when there are a plurality of any of X1 to X4 and Y1 to Y4, they may be the same or different; a1 to a4 and b1 to b4 represent the number of substituents X1 to X4 and Y1 to Y4, respectively; a1 to a4 each independently represent an integer of from 0 to 4 and are not 0 at the same time; and b1 to b4 each independently represent an integer of 0 to 4; and M represents a hydrogen atom, metal atom or oxide, hydroxide or halide thereof.

11. The dye represented by the formula (I) is a dye represented by the following formula (II): ([0144]-[0148]).



wherein X11 to X14, Y11 to Y18 and M each have the same meaning as those in the formula (I); and a11 to a14 each independently represent an integer of 1 or 2.

12. A method for ink jet recording, comprising using the ink for ink jet recording (see Examples; [0260]-[0265]).

13. The image-receiving material including an image-receiving layer containing an inorganic white particulate pigment on a support ([0260]-[0262]).



14. A method for producing the ink for ink jet recording according to claim 1, which comprises at least applying an ultrasonic vibration ([0263]).

15. The ink for ink jet recording prepared is filtered through a filter having pores of an effective diameter of not greater than 1  $\mu\text{m}$  and defoamed before use (see Examples).

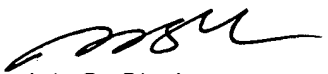
### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Manish S. Shah whose telephone number is (571) 272-2152. The examiner can normally be reached on 8:00am-4:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stephen D. Meier can be reached on (571) 272-2149. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Manish S. Shah  
Primary Examiner  
Art Unit 2853

MSS

7/6/06